B1

b) the gas stream from a) is shifted, in one step, whereby the content of CO is reduced and the amounts of CO_2 and H_2 are increased by reaction of H_2O at a ratio H_2O:CO of from 1 to 9;

c) the gas stream from b) is separated in a separation unit into a CO_2-rich and a H_2-rich gas stream, respectively.

B2

4. (Twice Amended) Method according to claim 1, c h a r a c t e r i z e d i n that the ratio H_2O:CO in the shift process is from 1.5 to 4.

B3

11. (Twice Amended) Method according to claim 1, c h a r a c t e r i z e d i n that the reformer reactor is a partial oxidation reactor.

12. (Twice Amended) Method according to claim 1, c h a r a c t e r i z e d i n that the reformer reactor is an autothermal reformer.

B4

14. (Amended) Method according to claim 11, c h a r a c t e r i z e d i n that the reforming is carried out without a catalyst.

16. (Amended) Method according to claim 10, c h a r a c t e r i z e d i n that the CO_2-rich gas stream includes at least part of N_2.

B5

17. (Amended) Method according to claim 1 wherein the produced CO_2-rich gas stream is applied for injection into marine formations.

18. (Amended) Method according to claim 1 wherein the produced H_2-rich gas stream is applied for hydrogenation.

19. (Amended) Method according to claim 1 wherein the produced H_2-rich gas stream is applied as a source of energy / fuel in fuel cells.

B5

20. (Amended) Method according to claim 1 wherein the produced H_2-rich gas stream is applied for the production of electricity.